Massachusetts
MIT Sea Grant College Program
2011 NSGO Review

Michael Liffmann

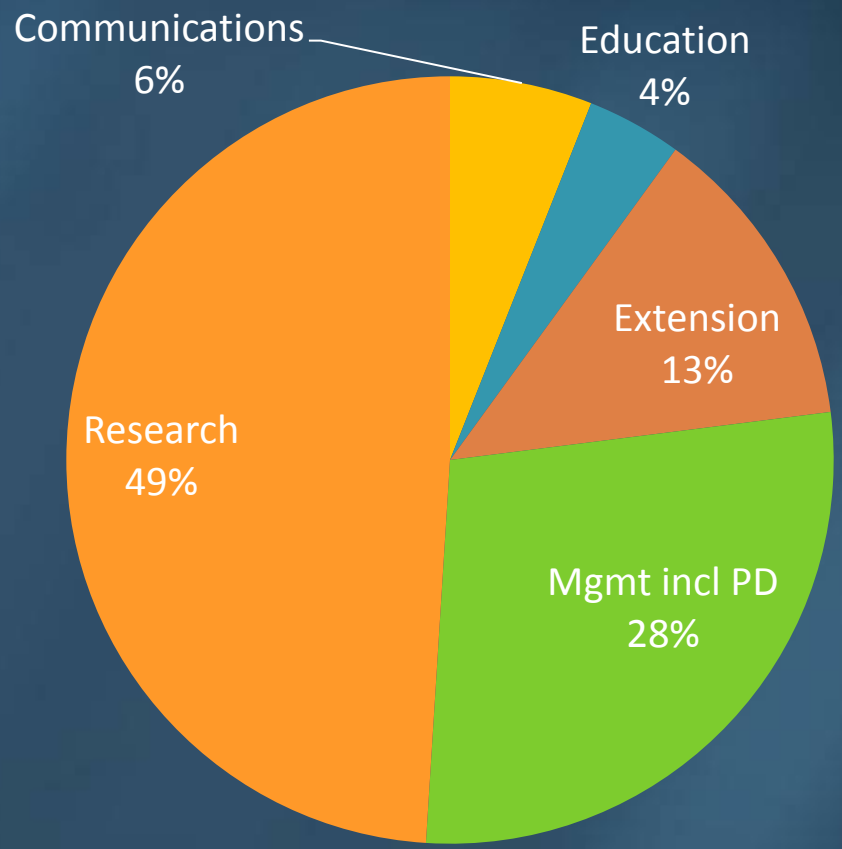
Program Management

- Management staff
  - Chrys Chryssostomidis—Director
  - E. Eric Adams- Assoc. Director for Ocean Utilization (environmental research)
  - Tim Downes- Assistant Director
  - Judy Pederson-MAS Leader
  - Kathy de Zengotita-Program Coordinator

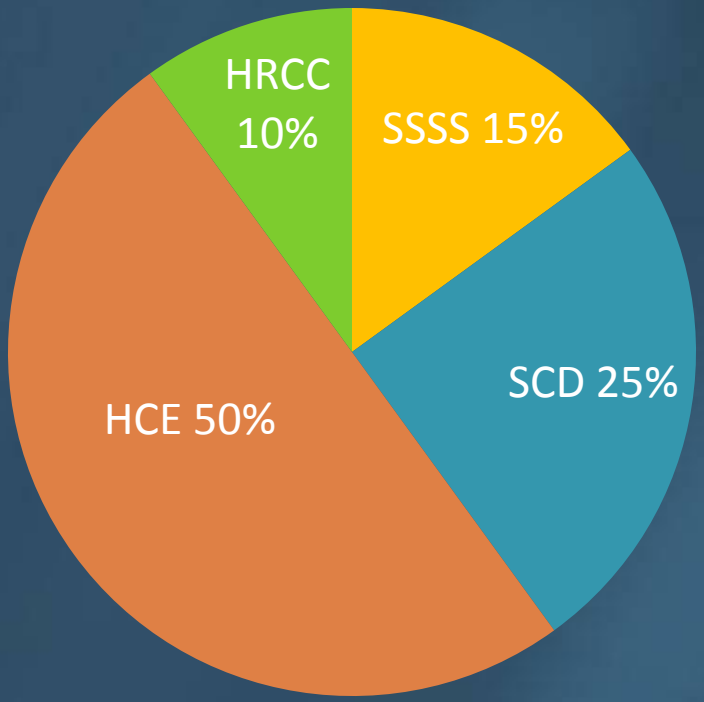
Functional Area	# of individuals	# of FTEs supported by SG	# of FTEs supported by match/leverage
Mgt/Admin	11.00	2.78	4.00
Comm.	4.00	1.69	0.42
Ext.	6.00	0.58	2.33
Education	6.00	0.58	2.50
Research	35.00	2.75	7.67

- Large Program

MIT Budget and Functional Areas



MIT Budget and Focus Areas



Significant Program Changes

- None

Program Requested Changes to 2010-2013 Program Plan

- None yet

MIT Performance Measures

- Development of models—*Didemnum,* highly toxic pollutants, circulation, sensor placement for ocean data assimilation
- Development of community databases for marine bioinvasions
- Students—high school, undergraduate, graduate
- Social Impact Assessments—fisheries
- Development of prototype sensors and underwater vehicles

MIT Contribution to National Performance Measures and Metrics

- Students—1 Knauss, 14 undergraduates, ten Masters, 13 PhD, and 7,100 K-12
- Organized meetings—90 with 134,000 attendees

  Public/professional—34 with 84,000 attendees
- Focus area metrics—HCE (“Tools, technologies and information services…”)– 7 and 14 anticipated for 2010-11

Program Impacts

- **INVASIVE SPECIES--**Influenced Governor of MA to sign proclamation that boat owners responsible for clearing boats of invasive species
- **TESTING TOXIC SEDIMENTS--**Many sediment beds throughout the United States are toxic to benthic organisms, preventing use of these ecosystems for fisheries and shell-fishing. For us to decide where to clean up, we need to assess the hazard posed. Developed a method to sample and analyze sites of concern to see if such toxicity is present.

Program Impacts (cont.)

- **AUVs** - Enhanced the ability of AUVs to map and sample the marine environment; development of hybrid AUV/ROV operated via, and transmits data over, the Web; other capabilities added to these important oceanographic tools.
- **MA BAY OUTFALL MONITORING** PROGRAM—Science Advisory Panel recommended significant changes to the Program that will result in savings to the MA Water Resources Authority's sewage treatment facility.

2009 Research Accomplishments

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- Design Lab established for electric ship R&D, T-Craft, and OpenProp development
- Offshore Industry funds “Deepstar” for underwater video transmission